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Matthew Krokosz

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EXAMINER

PANNALA, SATHYANARAYAN R

ART UNIT

PAPER NUMBER

2164

MAIL DATE

DELIVERY MODE

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PAPER

**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

# Office Action Summary

Application No.

10/631,154

Applicant(s)

KROKOSZ, MATTHEW

Examiner

Sathyanarayan Pannala

Art Unit

2164

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

## Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

## Status

- 1) ☒ Responsive to communication(s) filed on 24 July 2007.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

## Disposition of Claims

- 4) ☒ Claim(s) 1-15 and 27-29 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-15 and 27-29 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

## Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

## Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
  - ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

## Attachment(s)

- ☐ Notice of References Cited (PTO-892)
- ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- ☐ Information Disclosure Statement(s) (PTO/SB/08)  
Paper No(s)/Mail Date \_\_\_\_\_
- ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_\_
- ☐ Notice of Informal Patent Application
- ☐ Other: \_\_\_\_\_

## **DETAILED ACTION**

### ***Election/Restrictions***

1. Applicant's response filed on 7/24/2007 to the Restriction/Election of claims by electing claims 1-15 and 27-29 (group I) without traverse. In response to this Office Action, Applicant is reminded to cancel non-elected claims 16-26 (Group II).
2. In this Office Action, claims 1-15 and 27-29 are pending.

### ***Drawings***

3. The drawings are objected to under 37 CFR 1.83(a). The drawings must show every feature of the invention specified in the claims. Therefore, the claims 1 and 27 must be shown or the feature(s) canceled from the claim(s). No new matter should be entered.

Corrected drawing sheets in compliance with 37 CFR 1.121(d) are required in reply to the Office action to avoid abandonment of the application. Any amended replacement drawing sheet should include all of the figures appearing on the immediate prior version of the sheet, even if only one figure is being amended. The figure or figure number of an amended drawing should not be labeled as "amended." If a drawing figure is to be canceled, the appropriate figure must be removed from the replacement sheet,

and where necessary, the remaining figures must be renumbered and appropriate changes made to the brief description of the several views of the drawings for consistency. Additional replacement sheets may be necessary to show the renumbering of the remaining figures. Each drawing sheet submitted after the filing date of an application must be labeled in the top margin as either "Replacement Sheet" or "New Sheet" pursuant to 37 CFR 1.121(d). If the changes are not accepted by the examiner, the applicant will be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.

***Claim Rejections - 35 USC § 112***

4. The following is a quotation of the first paragraph of 35 U.S.C. 112:

The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

5. Claims 1-15 and 27-29 are rejected under 35 U.S.C. 112, first paragraph, because the best mode contemplated by the inventor has not been disclosed.

Evidence of concealment of the best mode is based upon "a key that is a 'best-pattern match' of a data string means that the key has a maximum number of the same digits of the data string... If the data string is person's name, the digits can be either the first name or the last name or even can be a predetermined combination of them." (see specification, paragraph [0019]). There is no relation between digits for a phone call

routing and a name relating to routing. Applicant cannot convert his idea fully into implementing method. For example, Applicant is claiming in claim 8, as "digits are alphanumeric characters."

6. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter, which the applicant regards as his invention.

7. Claim 1 is rejected under 35 U.S.C. 112, second paragraph, as being incomplete for omitting essential elements, such omission amounting to a gap between the elements. See MPEP § 2172.01. The omitted elements are: the relation between limitation two, limitation three and limitation four.

8. Claims 1-15 and 27-29 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention. The best mode of implementation is not laid down clearly.

***Claim Rejections - 35 USC § 101***

9. 35 U.S.C. 101 reads as follows:

Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

10. Claims 1-15 and 27-29 are rejected under 35 U.S.C. § 101, because none of the claims are directed to statutory subject matter. Independent claims 1 and 27 deals with simple abstract idea and non-implement-able. A claim that recites a computer that solely calculates a mathematical formula or a computer disk that solely stores a mathematical formula is not directed to the type of statutory subject matter eligible for patent protection. The claims are not producing useful, concrete and tangible results. See *Diehr*, 450 U.S. at 186 and *Gottschalk v. Benson*, 409 U.S. 63, 71-72 (1972).

11. Claims 27-29 are rejected under 35 U.S.C. § 101, because claims are directed to non-functional descriptive material consisting of data structures. Independent claim 27 is claiming a data structure per se. Functional type of "descriptive material" is nonstatutory when claimed as descriptive material per se. *Warmerdam*, 33 F.3d at 1360, 31 USPQ2d at 1759.

### ***Claim Rejections - 35 USC § 102***

12. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the

applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

13. Claims 1-26 are rejected under 35 U.S.C. 102(e) as being anticipated by Yau (US Patent 6,741,688) hereinafter Yau.

14. As per independent claim 1, the only one drawing provided and does not fully relate to the claim. Yau teaches an electronic method for handling telephone calls includes a telephone number template. The template preferably is as wide as a telephone number is long and identifies one or more telephone number digits by the digit positions within a telephone number field for comparison purposes (col. 1, line 66 to col. 2, line 4). Yau teaches the claimed, associating a plurality of keys with a plurality of respective predetermined records in the database, wherein each key comprises a data string of one or more digits, associating each digit in the data string with a respective level of a plurality of levels of said database as a function of the position of the digit in the data string, obtaining an instruction at a first said level, wherein the instruction is associated with one or more records in the database and checking for another instruction at a second said level, and if the another instruction does not specify a record, returning to the first level and indexing the data string in accordance with the one or more records associated with the instruction at the first level (Fig. 2, col. 3, line 57 to col. 4, line 36 and col. 4, lines 21-27).

15. As per dependent claim 2, Yau teaches the claimed, each of said keys represents a group of telephone numbers (Fig. 2, col.4, lines 5-7).
16. As per dependent claim 3, Yau teaches the claimed, each of said keys is a specified portion of each telephone number of said group (Fig. 2, col. 4, lines 37-38).
17. As per dependent claim 4, Yau teaches the claimed, said specified portion is a starting portion of said each telephone number of said group (Fig. 2, col. 4, lines 37-38).
18. As per dependent claim 5, wherein said starting portion comprises one or more digits (Fig. 2, col. 4, lines 37-38).
19. As per dependent claim 6, Yau teaches the claimed, records are call processing instructions (Fig. 2, col. 4, lines 5-5).
20. As per dependent claim 7, Yau teaches the claimed, call processing instructions are routing instructions (col. 2, lines 44-48).
21. As per dependent claim 8, Yau teaches the claimed, digits are alphanumeric characters (Fig. 2, col. 4, lines 18-20).



22. As per dependent claim 9, Yau teaches the claimed, each of said keys represents a group of data entries of said database (Fig. 2, col. 3, lines 57-61 and col. 4, lines 30-33).

23. As per dependent claim 10, Yau teaches the claimed, each of said records is a destination assigned to said group represented by said each key (Fig. 2, col. 4, lines 21-23).

24. As per dependent claim 11, Yau teaches the claimed, a sequence of said plural levels corresponds to a sequence of said digits in said data strings (Fig. 2, col. 4, lines 23-27).

25. As per dependent claim 12, Yau teaches the claimed, sequence of the digits is a natural order of the digits in the data string (Fig. 2, col. 4, line 65-67).

26. As per dependent claim 13, Yau teaches the claimed, a first level represents a first digit, a second level represents a second digit, a third level represents a third digit, and so forth (Fig. 2, col. 5, lines 57-61).

27. As per dependent claim 14, Yau teaches the claimed, sequence of the digits is determined by a specified priority of each digit in the data string (Fig. 2, col. 6, lines 52-61).

28. As per dependent claim 15, Yau teaches the claimed, a first level represents a digit of a highest priority, a second level represents a digit of a secondly highest priority, a third level represents a digit of a thirdly highest priority, and so forth (Fig. 2, col. 5, lines 57-61).

29. As per independent claim 27, Yau teaches the claimed, associating a plurality of keys with a plurality of respective records in the data structure, wherein each key comprises one or more digits, each said digit having a digit position within its key, associating a plurality of levels of the data structure with respective positions of the digits within the keys and providing at least one indexing instruction for each said level of the data structure, wherein each said indexing instruction comprises: a first sub-instruction comprising a direction to do one of: proceeding to a next level of the data structure, and not proceeding to the next level of the data structure; and a second sub-instruction comprising a direction to do one of: specifying a record associated with the level; and ii) not specifying a record. This claim is rejected under the same rationale as claim 1.

30. As per dependent claim 28, Yau teaches the claimed, each said indexing instruction at a given level is associated with a selected value of the digit at the position associated with the given level. This claim is rejected under the same rationale as claim 13.

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31. As per dependent claim 29, indexing method is configured to enable a best-pattern-match comparison between a phone number and said plurality of keys in said multilevel data structure. This claim is rejected under the same rationale as claim 4.

### ***Response to Arguments***

32. Applicant's arguments filed on 3/9/2007 have been fully considered but they are not persuasive and details as follows:

- a) Applicant's argument stated as "Changes to the specification." Examiner approved the amendment to specification.
- b) Applicant's argument stated as "In this response, claims 4 and 14 are accurately indicated as "previously presented." Examiner agrees that the claims status is valid and objection is withdrawn.
- c) Applicant's argument regarding rejection under 35 USC 101 stated as "After USPTO personnel identify and explain in the record the reasons why a claim is for an abstract idea with no practical application, then..."

In response to Applicant's argument, Examiner respectfully disagrees because merely amending a limitation or the preamble will not overcome the U.S.C. 101 rejection. The whole claim has to be investigated and it is amended accordingly to meet the requirement of the claim must be useful, concrete and tangible. So the claims 1 and 27 are still have the non-statutory subject matter.

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The Best Mode of the invention implementation is not disclosed. See details in the section under 35 USC 112. Regarding claim 27, Applicant is claiming for a data structure, which is a non-patentable subject matter.

d) Applicant's argument stated as "The Applicant contends that Yau does not describe all of the limitations of claim 1."

In response to Applicant's argument, Examiner respectfully disagrees because Yau teaches over all the same method used to call routing using pattern matching concept of digit by digit of the telephone number testing and the same is disclosed by the current application (Fig. 2, col. 3, line 57 to col. 4, line 36 and col. 4, lines 21-27). Further to Applicant's arguments, a recitation of the intended use of the claimed invention must result in a structural difference between the claimed invention and the prior art in order to patentably distinguish the claimed invention from the prior art. If the prior art structure is capable of performing the intended use, then it meets the claim.


### ***Conclusion***

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Sathyanarayan Pannala whose telephone number is (571) 272-4115. The examiner can normally be reached on 8:00 am - 5:00 pm.

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If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Charles Rones can be reached on (571) 272-4085. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

  
Sathyanarayan Pannala  
Primary Examiner

srp  
September 15, 2007